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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/936,465	04/01/2002	Homaira Naseem	1207SUS03	4143

7590 11/19/2003

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EXAMINER

SHOSHO, CALLIE E

ART UNIT PAPER NUMBER

1714

DATE MAILED: 11/19/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/936,465	Applicant(s) NASEEM, HOMAIRA	
	Examiner Callie E. Shosho	Art Unit 1714	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 01 August 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4,6-8 and 10-15 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4,6-8 and 10-15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. All outstanding rejections are overcome by applicants' amendment filed 8/1/03.

This action is non-final in light of the new grounds of rejection as set forth below.

Claim Rejections - 35 USC § 102/§ 103

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-4 and 10-13 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Christiani et al. (U.S. 5,747,560) taken in view of the evidence in or, in the alternative, in view of Barriac (U.S. 4,721,221).

Christiani et al. disclose molded article molded from a melt-processible composition comprising (i) thermoplastic polymer such as polyolefin including polyethylene, polypropylene, ethylene-propylene copolymer, and ethylene-propylene-diene copolymer as well as poly(styrene)-poly(butadiene)-poly(styrene) and (ii) layered montmorillonite clay having platelets with diameter ranging from 0.005 to 1 micron. There is also disclosed a method for

decreasing the gas permeability of the thermoplastic material by using montmorillonite clay as disclosed above (col.5, lines 20-30, col.7, lines 35-41, col.16, lines 41-44, col.17, lines 48-50, col.18, lines 7 and 21-23, col.20, lines 12-13, col.22, lines 2-3, col.24, lines 9-11 and 15-16, and col.25, lines 35-37).

On the one hand, it is noted that Christiani et al. disclose composition used to make molded articles (col.24, lines 9-11). While Christiani et al. is generic to molded articles, it does specifically mention containers. However, it is well known, as evidenced by Barriac (col.4, lines 15-21) that beverage container closures are molded articles made from thermoplastic polymers such as polyolefin. Further, it is noted that there is no requirement in the present claims regarding the structure of the beverage container closure. Thus, it is clear that the disclosure of molded articles in Christiani et al. inherently includes beverage container closures as presently claimed.

In light of the above, it is clear that Christiani et al. anticipate the present claims.

Alternatively, on the other hand, although there is no explicit disclosure in Christiani et al. of beverage container closure, in view of the fact that the composition of Christiani et al. is taught to be especially advantageous to make molded articles (col.24, lines 27-29) and further in view of the fact that Barriac (col.4, lines 15-21) provides evidence that a beverage container closure is but one well known example of a molded article, it therefore would have been obvious to one of ordinary skill in the art that the composition of Christiani et al. would have been intrinsically useful to make a beverage container closure, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

4. Claims 6-8 and 14-15 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Christiani et al. (U.S. 5,747,560) taken in view of the evidence in or, in the alternative, in view of Barriac (U.S. 4,721,221).

Christiani et al. disclose molded article molded from a melt-processible composition comprising (i) thermoplastic polymer such as polyolefin including polyethylene, polypropylene, ethylene-propylene copolymer, ethylene vinyl acetate copolymer, and ethylene-propylene-diene copolymer as well as poly(styrene)-poly(butadiene)-poly(styrene) and (ii) layered montmorillonite clay having platelets with diameter ranging from 0.005 to 1 micron. There is also disclosed a method for decreasing the gas permeability of the thermoplastic material by using montmorillonite clay as disclosed above (col.5, lines 20-30, col.7, lines 35-41, col.16, lines 41-44, col.17, lines 38-39 and 48-50, col.18, lines 7-8 and 21-23, col.20, lines 12-13, col.22, lines 2-3, col.24, lines 9-11 and 15-16, and col.25, lines 35-37).

On the one hand, it is noted that Christiani et al. disclose composition used to make molded articles (col.24, lines 9-11). While Christiani et al. is generic to molded articles, it does specifically mention containers. However, it is well known, as evidenced by Barriac (col.4, lines 21-32), that beverage container sealant layers are molded articles made from thermoplastic polymers such as ethylene vinyl acetate. Thus, it is clear that the disclosure of molded articles in Christiani et al. inherently includes beverage container sealant layer as presently claimed.

In light of the above, it is clear that Christiani et al. anticipate the present claims.

Alternatively, on the other hand, although there is no explicit disclosure in Christiani et al. of beverage container sealant layer, in view of the fact that the composition of Christiani et al. is taught to be especially advantageous to make molded articles (col.24, lines 27-29) and further

in view of the fact that Barriac (col.4, lines 21-32) provides evidence that a beverage container sealant layer is but one well known example of a molded article, it therefore would have been obvious to one of ordinary skill in the art that the composition of Christiani et al. would have been intrinsically useful to make a beverage container sealant layer, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

5. Claims 1, 4, 10, and 13 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over WO 98/2499 taken in view of the evidence in or, in the alternative, in view of Fuchs (U.S. 4,749,044).

WO 98/29499 discloses molded article made from melt-processible composition comprising (i) thermoplastic polymer and (ii) layered montmorillonite clay having platelets with diameter ranging from 0.01 to 1 micron. There is also disclosed a method for decreasing the gas permeability of the thermoplastic material by using montmorillonite clay as disclosed above (page 3, lines 25-27, page 5, lines 1-5, 9-10, and 15-19, page 6, lines 8-10, and page 19, lines 13-15).

On the one hand, it is noted that WO 98/29499 disclose composition used to make molded articles (page 3, line 26). While WO 98/29499 is generic to molded articles, it does specifically mention beverage containers. However, it is well known, as evidenced by Fuchs (col.4, lines 22-30), that beverage container closures are molded articles made from thermoplastic polymers such as polyethylene terephthalate. Further, it is noted that there is no requirement in the present claims regarding the structure of the beverage container closure. Thus,

it is clear that the disclosure of molded articles in WO 98/29499 inherently includes beverage container closures as presently claimed.

In light of the above, it is clear that WO 98/29499 anticipate the present claims.

Alternatively, on the other hand, although there is no explicit disclosure in WO 98/29499 of beverage container closure, in view of the fact that the composition of WO 98/29499 is taught to be especially advantageous to make molded products (page 3, line 25-page 4, line 2) and further in view of the fact that Fuchs (col.4, lines 22-30) provides evidence that a beverage container closure is but one well known example of a molded article, it therefore would have been obvious to one of ordinary skill in the art that the composition of WO 98/29499 would have been intrinsically useful to make a beverage container closure, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

6. Claims 6, 8, and 14-15 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over WO 98/29499 taken in view of the evidence in or, in the alternative, in view of Barriac (U.S. 4,721,221).

WO 98/29499 discloses molded article made from melt-processible composition comprising (i) thermoplastic polymer and (ii) layered montmorillonite clay having platelets with diameter ranging from 0.01 to 1 micron. There is also disclosed a method for decreasing the gas permeability of the thermoplastic material by using montmorillonite clay as disclosed above (page 3, lines 25-27, page 5, lines 1-5, 9-10, and 15-19, page 6, lines 8-10, and page 19, lines 13-15).

On the one hand, it is noted that WO 98/29499 disclose composition used to make molded articles (col.24, lines 9-11). While WO 98/29499 is generic to molded articles, it does specifically mention beverage containers. However, it is well known, as evidenced by Barriac (col.4, lines 21-32), that beverage container sealant layers are molded articles made from thermoplastic polymers. Thus, it is clear that the disclosure of molded articles in WO 98/29499 inherently includes beverage container sealant layer as presently claimed.

In light of the above, it is clear that WO 98/29499 anticipate the present claims.

Alternatively, on the other hand, although there is no explicit disclosure in WO 98/29499 of beverage container sealant layer, in view of the fact that the composition of WO 98/29499 is taught to be especially advantageous to make molded articles (page 3, line 25-page 4, line 2) and further in view of the fact that Barriac (col.4, lines 21-32) provides evidence that a beverage container sealant layer is but one well known example of a molded article, it therefore would have been obvious to one of ordinary skill in the art that the composition of WO 98/29499 would have been intrinsically useful to make a beverage container sealant layer, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

Response to Arguments

7. Applicant's arguments regarding WO 93/04118, WO 99/03914, and Beall et al. (U.S. 5,830,528) have been considered and they are moot in view of the discontinuation of these references against the present claims.

8. Applicant's arguments filed 8/1/03 have been fully considered but they are not persuasive.

Specifically, applicants argue that the examiner has not established a *prima facie* case of obviousness given that neither Christiani et al. nor WO 98/29499 disclose or suggest all the elements of the pending claims and further given that the examiner has failed to set forth any motivation to modify the cited references so as to apply the composition disclosed by either reference to a beverage container closure or sealant.

It is noted that the present claims are now rejected under 35 USC 102/103. With respect to the rejections under 35 USC 103, it is noted that in light of the new grounds of rejection as set forth above, it is the examiner's position that a *prima facie* case of obviousness has been established.

Christiani et al. and WO 98/29499 each disclose molded articles obtained from composition identical to that presently claimed. While there is no explicit disclosure in either reference of beverage container closure or sealant layer, it is well known as disclosed in Barriac and/or Fuchs that beverage container closure and beverage container sealant layer are molded articles obtained from thermoplastic polymer as are the molded articles of Christiani et al. or WO 98/29499. Thus, it therefore would have been obvious to one of ordinary skill in the art that the composition of either Christiani et al. or WO 98/29499 would intrinsically be useful to make beverage container closure or sealant layer. That is, given that Christiani et al. or WO 98/29499 each disclose molded articles and given that beverage container closure and sealant layer are types of molded articles, it therefore would have been obvious to one of ordinary skill in the art

to use the composition of Christiani et al. or WO 98/29499 to produce molded article which is beverage container closure or sealant layer.

Further, given that Christiani et al. is now used in combination with Barriac and WO 98/29499 is used in combination with either Fuchs (claims 1, 4, 10, and 13) or Barriac (claims 6, 8, and 14-15), it is the examiner's position that there is motivation to use the composition of either Christiani et al. or WO 98/29499 to make beverage container closure or beverage container sealant layer given that Christiani et al. and WO 98/29499 each disclose using composition identical to that presently claimed to make molded articles and given that Barriac and Fuchs teach that beverage container closure or beverage container sealant layer are types of molded articles, it therefore would have been obvious to one of ordinary skill in the art to use composition of either Christiani et al. or WO 98/29499 to make beverage container closure or beverage container sealant layer, and thereby arrive at the claimed invention.

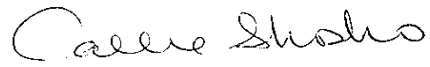
9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Callie E. Shosho whose telephone number is 703-305-0208. The examiner can normally be reached on Monday-Friday (6:30-4:00) Alternate Fridays Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vasu Jagannathan can be reached on 703-306-2777. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9310.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0661.

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A handwritten signature in cursive script that reads "Callie E. Shosho".

Callie E. Shosho
Primary Examiner
Art Unit 1714

CS
11/14/03